

REMARKS

Claim 15 has been cancelled without prejudice. Claims 1 and 21 have been amended.

Accordingly, claims 1-14 and 16-21 remain for consideration in this application.

**Claims 1-4, 7 and 15 are rejected under 35 U.S.C. 102(b) as being anticipated by Yamazaki (USP 4,587,935).**

**Yamazaki** discloses an outboard motor having a remote tachometer 26, wherein there is no hardwire connection between the Tachometer and the engine itself. As illustrated in Fig. 1, when an electrical impulse travels from coil 16, through wire 17 to spark plug 15 to initiate the ignition stroke in the engine, the magnetic field generated around spark plug wire 17 is sensed by sensing device 23. (See column 3, lines 1-5.) The current induced in sensor 23 then flows through conductor 25 to tachometer device 26 in order to display the engine speed.

The Office Action suggests that the spark plugs 15 are a “controller” and further that the spark plug wire 17 is considered to be a “radio communication apparatus”, as well as an antenna, as illustrated in **Yamazaki**, Fig. 1. Applicants respectfully traverse these assertions and submit that **Yamazaki** does not anticipate claim 1, and the claims dependent therefrom.

Specifically, claim 1 requires a controller and “a radio communication apparatus” connected to the controller. Applicants submit that spark plugs 15 are not a controller for the engine of **Yamazaki**. However, more importantly, **Yamazaki** does not function by “radio” communication. Sensor 23 is operated by the magnetic field created by the flow of electric current through spark plug wire 17. A magnetic field is not a radio wave. Radio is defined as follows:

The transmission and reception of electromagnetic waves of radio frequency, esp. those carrying sound messages: *cellular phones are linked by radio rather than wires. (The New Oxford American Dictionary; Pg. 1404).*

Thus, radio waves are electromagnetic waves. In other words, the magnetic field of **Yamazaki** is not the same as an electromagnetic wave of the radio communication apparatus of claim 1. Accordingly, claim 1 cannot be anticipated by **Yamazaki**.

The Office Action also notes that magneto flywheel 44 of Fig. 4 of **Yamazaki** would also be a radio communication apparatus. As with the discussion above, a flywheel magneto as in Fig. 4 operates on the basis of the magnetic field of the magneto itself, and not on the basis of an electromagnetic wave. Accordingly, the embodiment of Fig. 4 also cannot anticipate claim 1, or the claims dependent therefrom.

**Claim 5 is rejected under 35 U.S.C. §103(a) as being unpatentable over Yamazaki.**

Here, the Office Action takes “Official Notice” that the use of a resin material, such as fiberglass reinforced resin would be obvious for use in a cover for an outboard motor. However, claim 5 is dependent from independent claim 1, and limited to the additional features set forth therein. Accordingly, claim 5 is not obvious for the reasons set forth above with regard to claim 1.

**Claims 1, 3-5 and 7 are rejected under 35 U.S.C. §103(a) as being unpatentable over Holt (USP 6,431,930) in view of CA ‘699 (cited in the previous action).**

**Holt** is directed to an electronic control system for boats. Specifically, the **Holt** reference is similar to a “drive-by-wire” system for an automobile. In other words, the **Holt** system converts all of the control operations into electrical impulses and then transmits them to the

engine ECU of the outboard motor by way of electrical wires. There is no mechanical connection between the engine controls and the engine itself. In column 4, lines 1, 2, **Holt** discloses that it is possible the control signals may be sent from the control elements to the ECU without electrical wires, for example, by radio transmission.

As noted in our previous response, **CA '699** provides a remote control device in which a transmitter 20 transmits signals to receiver 22 which then retransmits signals to control different aspects of the outboard motor. Both the transmitter 20 and receiver 22 are outside of the engine cover. It is the position of the Office Action that **CA '699** shows a controller employing a radio transmission structure and a receiving antenna is mounted on the outboard motor.

It should be noted also that both **Holt** and **CA '699** are directed to means for remotely controlling an outboard motor. This is distinctly different from the purpose of the instant invention disclosed in this application, which is to relay data from the outboard motor to a remote location.

Specifically, claim 1, as amended, requires:

an operational condition detecting device for detecting an operational condition of the internal combustion engine, wherein the radio communication apparatus transmits to an outside an operational condition detected signal output from the operational condition detecting device.

Thus, both **Holt** and **CA '699** disclose remote engine control, as opposed to claim 1 which is directed to recovery of engine operational conditions.

Specifically, **Holt** discloses an ECU 34, which would be an engine controller. However, there is no disclosure in **Holt** of a “radio communication apparatus” connected to the controller

and “housed inside of the cover.” CA ‘699 does not disclose a radio communication apparatus and a controller, both housed inside of the cover. Therefore, even a combination of the two does not disclose, nor suggest, the features of claim 1. No combination of Holt and CA ‘699 discloses the feature that an operational condition detecting device detects an operational condition of the engine and transmits the operational condition to an outside location. In other words, neither reference discloses a radio communication apparatus that transmits the state or operating condition of the engine. Accordingly, claim 1 is not obvious over Holt or CA ‘699, individually or in combination.

In view of the amendments to the claims, and the remarks set forth above, it is submitted that the rejections have been overcome. Accordingly, it is respectfully requested that the rejections be withdrawn and that claims 1-14 and 16-21 be allowed.

Applicants wish to thank the Examiner for the indication that claims 6, 8-14 and 16-21 would be allowable if rewritten to overcome the rejections under 35 U.S.C. §112, second paragraph, as set forth in the Office Action. However, applicants were unable to find a rejection under 35 U.S.C. §112 in this Office Action.

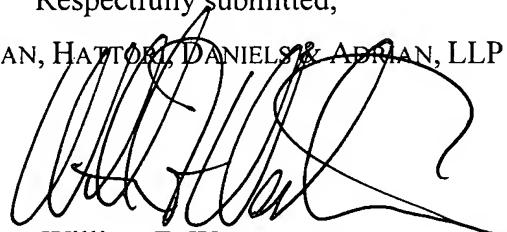
By: Ryuichi KIMATA et al.

Serial No. 10/665,274

If this paper is not timely filed, Applicants respectfully petition for an appropriate extension of time. The fees for such an extension or any other fees that may be due with respect to this paper may be charged to Deposit Account No. 50-2866.

Respectfully submitted,

WESTERMAN, HATTER, DANIELS & ADRIAN, LLP



William F. Westerman  
Attorney for Applicants  
Registration No. 29,988  
Telephone: (202) 822-1100  
Facsimile: (202) 822-1111

WFW/meu